NEMONES AND RANUNCULUS-FIRST GARDEN WORK OF SEASON

quently planted in the autumn as soon plant them in the early spring, as soon dark place under a bench in the con- stone or clump of dirt for ventilation as the frest is out of the ground.

Ranunculus are not quite as hardy If planted early in the autumn, so they the light. may get a start before the ground covered with rough straw to prevent off. continual thawing and freezing.

A sunny, sheltered location suits them best, in a fairly light rich soil, well drained.

A layer of sand should be placed under each root when they are planted to prevent decaying.

My opinion is that most failures with ranunculus are caused by too deep planting. From one to two inches is deep enough. These plants growing naturally grow among the grass, quite like daisles or dandellons and they are very pretty when naturalized that

Anemones may be treated in the same manner but should be planted on their sides if the gardener is unable to tell which side should be up.

For indoor culture ranunculus should be planted as soon as they arrive in the autumn. Plant in pots or bulb in gardening. pans, six bulbs to a six inch pot.

The soll should be fairly rich, with a little leaf mould and sand added. age in the way of pieces of broken pots in the bottom of the pots. A

Our 1919 Spring Catalog i

It contains a complete description

of the latest Novellies and Specialties in vegetables and flowers, as well as

ndards, which can be grown in your

It is attractively and conveniently

arranged, with pictures and text, and we feel sure that it will help you in planning your vegetable or flower garden.

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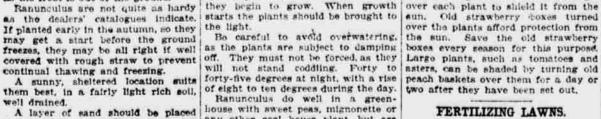
Hogs and Farm Machinery

Beginning Feb. 5. Columbia University will offer practical courses supported by excursions demonstrations and laboratory in the above subjects. Swine raising is taken up for ten lessons on Saturday afternoons and evenings in March. Other courses afternoons and evenings. Pees moderate. No entrance requirements.

den Roots. Send for it today-it is FREE.

equest. In writing kindly men-

now ready for distribution.



Ranunculus do well in a greenlouse with sweet peas, mignonette or any other cool house plant, but are trouble and give better results planted out in beds or in the benches. Anemones may be treated in a similar manner, only they are best grown in pots only. In the benches they make too many leaves. They can stand more heat than ranunculus but must have plenty of water when they become established.

George Ferguson is superintendent of the Payne Whitney estate. The numerous awards received at various exhibitions of flowers and vegetables is evidence of his experience and skill

The soil should be tairly rich, with a little leaf mould and sand added, grown choice anemones under glass being sure to provide plenty of drainfor the New York market. This year, on account of the war, it has been impossible to get good, sound bulbs and the results have been disappoint-

Mr. Bauman's system has been to pot the bulbs as early as possible and to keep them shaded in the greenuntil good root growth on made. The plants have then been set out in benches of earth in a cool greenhouse. Judicious watering Mr. Enumen considers the key to success. That is a matter only to be learned

Ranunculus give good results under he same treatment.

GETTING AN EARLY START IN THE GARDEN

Our growing season is comparatively short, but it can be considerably prolonged by means of the hetbed, cold frame and by utilizing a sunny window of the kitchen or living room.

Early plants of tomato, cabbage, peppers and eggplants can be started in shallow boxes in a sunny window if a hotbed or cold frame is not available. String beans, cucumbers, melons and sweet corn can be started in old cigar boxes. First bore a few holes in the bottom of the boxes for drainage and cover the bottom with cinders and then fill the box with light, sifted soil to within half an inch of the top. Have the soil moist, but not wet, before sowing the seed. A pane of glass over the top will keep the soil from draying out, but this must be removed to give the seedling air as soon as they appear. Even with the glass over the box the soil may require moisture, which must be supplied very carefully.

When the plants have formed one or two true leaves in addition to their seed leaves transplant them to another similar box of rich soil. Set the plants two inches apart each way, They can probably be allowed to grow in this box until they are ready to set out in the garden. The plants must have light and air to keep them strong and stocky. Long, lanky plants are undestrable.

The best time to set the plants out. In the garden is after sundown, pouring a little water about the roots of each plant, then draw a little dry earth up around the plant to prevent the soft from baking. Water the boxes of plants thoroughly before removing the plants.

planted in the autumn as soon tend to prevent decay. Cover to a turning a flower pot over them, rais-are received. I prefer to depth of one inch. Then place in a ling the north side up a little with a servatory or in a warm cellar until An old shingle can be set at an angle they begin to grow. When growth over each plant to shield it from the over the plants afford protection from Be careful to avoid overwatering, the sun. Save the old strawberry

FERTILIZING LAWNS.

The last of February or early in March is a good time to begin work on the lawn, so the alternate night freezing and thawing of the ground may be taken advantage of.

Ground bone is one of the Best fertilizers to use, and tankage gives good results. Prepared sheep manure is good and cotton seed meal, where it may be had at a low price, is also excellent, Wood ashes are good to use with all of these fertilizers or some other fertilizers containing potasii. Alphano humus is another good fertilizer for lawns.

In cleaning up the lawn do not begin the work too soon or a lot of footmarks will be left in the turf. Clean up the litter by hand picking.

if this is possible, if not use a wooder tooth rake.

As soon as freezing weather is over



Agriculture to change the misleading to get them from French nurseries, name of the organization, but has deMuch of the ground is foul and will grass plot. After a few weeks brush name of the organization, but has debenefit there may be from operating under a title which misleads and de-No good can be expected to come from an organization willing to lend itself to deception or operating DAHLIAS AS CUT FLOWERS. By GEORGE L. STILLMAN.

Not until recent years have dablias been looked upon by florists as a commercial flower. When one stops to consider the type of dahlias grown in the days of our grandfathers it is no wonder they were not used extensively for decorative purposes. In those days the blooms were diminutive in size and PLANTS WANTED. of a flat or oval shape, except a few of the show or ball shaped dahllas. Even they were very small and of colors that were not desirable for the florist's use.

tities of those ancient varieties grown throughout the country in private gardens by those who perhaps have never seen the newer creations. Believing the dahlia could be developed to a much higher standard

organization, having no appointment! According to Sir Harry Veltch in 1 Old potting soil from greenhouse or commission from the United States France alone 175,000 acres have been pots or benches makes an excellent devastated by German barbarism. At dressing for lawns that are subject Mr. Hidsdale, the secretary, has been least 500,000 fruit trees will be reto burning in the summer. Mix well requested by one of the secretaries of quired to replace those wantonly dethe United States Department of stroyed and he believes it will be best soil. See that the whole is well put-

clined to do so, preferring to have what not be fit for planting for a long time. the lawn with a birch broom and the In addition to fruit trees, seeds are top dressing will disappear. greatly needed and implements.

Belgium was the centre of European gardening, but transport difficulties and similar roses should be cut back there are enormous. "He went from to about one foot when planted Train Bruges to Brussels, seventy miles, and up the new growth so it will become It took twenty-six hours by rail, show- well ripened and next year it will ing the fearful state of the rallway bloom abundantly.

tracks. Giving the prices of seeds in Belsium, Sir Harry said leek was about \$145 per pound, onion seed the same price and another seed which in nor-mal times was 12 cents a pound, was

New varieties of plants frequently happen, simply as freaks of nature. A sowing of tomato seeds may de velop one plant that will produce fruit quite distinct from all the others and if the form, color, productiveness or flavor make it superior to its parents it may be worth carefully saving and multiplying by saving the seeds and increasing the stock in this manner. This variation or difference in character from the parent is likely to occur in any vegetable-cabbages, potatoes, beets, radish, onion, cucum ber and others. The method of increasing the stock may differ with different plants.

The variation is not confined to edible plants and is pernaps most frequent in flowering plants. All of the annuals show marked differences to a close observer-asters, phlox, zinnias and all the others. Other plants raised from seeds - dahllas, gladioli, iris. peoples. &c .- seldom come true or produce the same flower as the parent.

Plants like roses and carnations sometimes "sport." that is throw out branch producing flowers very different from the parent. All this is true of fruit plants-strawberries, blackberries, raspberries, currants, &c., and of the pomaceous fruits, apples, peaches, cherries and plume.

Sometimes fruits and flowers of new varieties have remained for years in the garden where they originated before some one brought them to the attention of the public. If there are destrable warieties of plants anywhere, better than those listed by seedsmen and nurserymen, THE SUN Garden Department would like the particulars.

The annual midwinter meeting of the Michigan State Horticultural Soclety will be held at Fennville February 11 and 12. James Nichols of South Haven is president of the society. The Hon Charles W. Garfield of Grand Rapids is still an officer and an active

If the groundhog theory is correct look out for severe weather. Certainly the old fellow saw his shadow very clearly last Sunday

"The Home Fruit Grower," by Prof. M. G. Kains, is an unusually valuable book for amateurs, briefly covering about every phase of fruit growing, including nuts of various kinds that may be grown in America. The work is profusely illustrated, in fact much the story is told by the pictures. be grown in pots out he six works on horticulture produced

"The Garden Blue Book," by Loices-er E. Holland, describes more than 200 hardy perennials. Its distinguish- abundant bearers of ing feature is a color chart showing at a glance the height, time of flowering, color of the bloom, preference for sun or shade or wet or dry soil. fragrance, keeping qualities of flowers

A page is devoted to each plant, setting forth its character, description, cultural directions and a photographic reproduction. Doubleday, Page & Co.

American Pillar, Dorothy Perkins



That Victory Garden Delicious crisp Radishes and Lettuc on your table in six weeks, and other vegetables ready to plant out. A ten-porary structure will do.

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Grand Rapids Lettuce. Scarl Globe Radish, Jersey Wakefield Ca-bage. Bonny Best Formato. New Vienna Kohlrabi, Green Onton See These 6 pkts. purchased 350 separately, 50c prepaid for 350

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t is one of the most interesting of in living rooms or con-



fruit of history. Our dwarf varieties can be grown in pots or tubs servatory. They can of doors in the summer and wintered in the They are Try one and it will soon by your favorite plant. \$1 each, Five for \$3. Foliage each, Five for \$3. Foliage show how fruit is produced.

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GENERAL CHEMICAL COMPANY

Insecticide Department, 18th From 15 Sread Street, N. Y.

fresh grass seed should be sown, and

of the quantity white clover. Most of will no doubt prove equally so against mere stubs. In a year or two an en- market the dahlla has proved itself the seedsmen have good mixtures of peach and other borers. Do not depend tirely new growth will be formed which a winner. During the year 1918 it was their own.

seed while the ground is freezing a little each night and thawing in the daytime, and Velieve they get a better lawn by this method than by sowing the seed on land where it will not be quickly covered. After the lawn has been cleaned and

in passing over it, does not eink below he general level.

in England. Permission has been strongth of the vine. The usual vine asked of the Government to import will have four or five branches, which them from Holland or America.

VICK'S

Garden and Floral

For 1919 GUIDE NowReady

Everyons interested at all in gardening hands have a copy. For seventy years the ending authority in systemic, from and lover seets, giving accurate, houses not natruettee information about planting.

inducement to try our Quality Seeds we offer:

ANOTHER

he plants.

After the plants have been set they fresh grass seed should be sown, and A wash has been recommended for over four feet long. A strong vine and become a very useful commercial apple tree borers made from raw lines should not be permitted to retain more flower, enterprising florists and pares seed that a good lawn can be seed oil and pure white lead. Remove than a quarter of its last year's wood, deners by experimental hybridizing Use one pound of grass seed to each piece twenty feet square for the first seeding and from a quarter to a half of this amount for reseeding.

For the northern part of the United States Kentucky blue grass and redtop are standard, with about one-tenth of the quantity white clover. Most of the grant for the grant to additional the card, kemove the care four or five inches from the base of the tree, scrape off the dirt and loose bark scales, and after worming the burrows with a wire apply to the exposed trunk a thick uniform down. Be careful to cut off all dead and diseased wood.

They have succeeded in producing the large down. Be careful to cut off all dead and diseased wood.

States Kentucky blue grass and redtop are standard, with about one-tenth of the quantity white clover. Most of will no doubt prove equally so against the carth for four or five inches from the base of the tree, scrape off the dirt they will be low headed and spreading. They have succeeded in producing the large down. Be careful to cut off all dead and diseased wood.

Very old peach trees should be trimmed so they will be low headed and spreading. They have succeeded in producing the large down. Be careful to cut off all dead and diseased wood.

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Solution to the paint is effective for peach borers it will be low headed and spreading.

They have succeeded in producing the heads and spreading.

They have succeeded in producing the paint is effective for peach borers will be low headed and spreading.

They hav

1. Border of Anemones. 2. Anemones. 3. Ranunculus.

Some gardeners prefer to sow grass oughly worming the trees with a wire, will produce a good crop of fruit.

SPRING PRUNING.

Grapes should be pruned and the work completed by the middle of

Prune back last year's wood until seeded, give it a good rolling as soon there are only a few buds left on it. as the turf is dry enough so the relier. A shoot will start from back of these There is a shortage of gladioli bulbs wood to leave depends upon the

buis in the spring, and each shoot will bear three or more bunches of

should be cut back until they are not

THREE SPLENDID NEW ASTERS The Reward of Years of Careful Plant Breeding

isfactory yellow yet produced. While led to believe that Ridsdale is a repnot as striking as its more brilliantly resentative of the United States Govcolored cousins, its delicate hue of pure ernment, which he is no sulphur yellow endears it at once to the heart of every true lover of beauty. Per packet 25

Vick's Glorious Peace Aster Collection. One packet each four colors branching asters—White 10c, Pink 10c, Purple 10c, Rose 10c, together with valuable booklet, "How to Grow Asters." All for 25c. JAMES VICK'S SONS

The Marvelous New Ruffled

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GOSHEN, IND.

In hot beds during February seeds may be sown of early calbage and cauliflower, onion, parsley and rad In March lettuce, early beets, to-mate and any of the seeds mentioned

in the paragraph above. In April sow pepper, cucumber, melon and any of the seeds mentioned for February and March sowing.

> THE GLEN ROAD IRIS GARDENS WILLESLEY FARMS. MASSACHUSETTS.

dahlia possesses decorative qualities

was thoroughly demonstrated during

are now taking up dahlia growing to pastime as well as for profit. Here i

one instance where a profitable bust

ness was started by an enterprisin

stances where women with small gar-

dens are making a good income by

SEEDS TO SOW IN HOT BEDS.

All dead and dried peaches should be as a commercial cut flower, surpassing

carefully removed from the tree and in range of colorings and beauty. I

Two illustrated lectures of special interest to amateur gardeners in the vicinity of New York city will be given in Schermerhorn Hall, at Columbia to ful funeral pieces made up of the new

University, on Friday, February 14, by types of dahlias, for which high prices

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ment you can imagine. Acclaimed the most important horticultural acquisition of recent years. Awarded the

De Luc's Golden Giant is the result of 12 years' selection from the product of the Howling Mob crossed with Golden Bantam and combines all the good points of both

This seed offered by the originator is 2 years in advance of that sold by competitors (as to selection). Beware of substitutes.

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Each of these new varieties has strong sturdy plants and bears a pro-fusion of exceptionally large double flowers with long stems. Unquestionably three of the most attractive varieties ever produced by the concern that has introduced more new distinct varieties than all other American seedsmen combined, the Pioneer Mail-order Seedhouse of America largest growers of asters in the world—with more than 600 acres devoted to producing vegetable, farm and flower seeds and plants. As an

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Prof. M. G. Kains, lecturer on horticulture. At 4.15 P. M. Prof. Kains
will speak on "Growing Fruits for
Home Use," and at 8.15 P. M. his subject will be "Improving the Home
Vegetable Garden." Both lectures are
open to the general public. open to the general public.

(3)

open to the general public.

Prof. Kains for years has preached fruit growing to the farmers of New York and the New England States and the New England States and the New Fork on hortiis well known for his books on horti-culture and his frequent contributions to the horticultural press. Prof. Kains the only person deriving benefit from the appropriate and fruit dahlias as cut flowers. Many women

UNDER FALSE COLORS.

An English garden magazine in a woman. In 1917 she started selling recent issue under the heading, "U. S. cut dahlins and sold \$25 worth from the Garden Secretary Wants to the few she was growing for her own Know," states: "Before leaving use. The next year, 1918, her sales New York, P. S. Ridsdale, secretary amounted to \$118 from the plants New York, P. S. Endsdale, secretary amounted to vits from the plants grown from the natural increase of sides of Washington, who is visiting this country to study the system of this country to study the system of sides being a profitable business it furnished.

It is plain from the heading of the article that the English people are growing dahlias for cut flowers.

The so-called National War Garden Commission is purely an independent

Kinds (and others) Originated by